AMENDMENTS TO THE CLAIMS

Claims Pending:

- At time of the Action: Claims 1-13 and 16-27
- Amended Claims: Claims 1, 10, 11-13, 16, 25, 26, and 27
- After this Response: Claims 1-13 and 16-27

This listing of claims will replace all prior versions and listings, of claims in the application.

1. (Currently Amended) A method for inventorying a switch fabric in a broadband access network multiplexing element, the multiplexing element comprising a managed element in a broadband access network management system coordinated by a network manager, the method comprising:

inventorying a switch fabric in a broadband access network multiplexing element in a broadband access network from a remote location;

forming a portion of the broadband access network with a digital subscriber line access multiplexer (DSLAM);

establishing communication with an element manager in the plurality of element managers from a the remote location, the element manager comprising an intermediary between the network manager and the multiplexing element;

gathering status information for the multiplexing element in a plurality of multiplexing elements by issuing a first interface retrieve command to the element manager from the remote location, wherein gathering the status information comprises determining a number of logical cross-connects provisioned in the multiplexing elements;

gathering status information for the switch fabric by issuing a second interface retrieve command to the multiplexing element from the remote location by utilizing the status information from the element manager;

repeating the gathering status information for the switch fabric for each remaining multiplexing element in the plurality of multiplexing elements; ~~and~~

repeating the gathering status information for the element manager for each remaining element manager in the plurality of element managers;

receiving and compiling the status information into a report; and

maintaining an inventory of the number of cross-connects in the DSLAM and in the broadband access network from the remote location.

2. (Original) The method of claim 1 wherein the establishing communication with the element manager from the remote location comprises establishing a TCP/IP session with the element manager.

3. (Original) The method of claim 2 wherein the establishing the TCP/IP session with the element manager comprises establishing a terminal emulation protocol session with the element manager.

4. (Original) The method of claim 3 wherein the establishing the terminal emulation protocol session with the element manager comprises establishing a telnet session with the element manager.

5. (Original) The method of claim 2 wherein the establishing the TCP/IP session with the element manager comprises establishing a TCP/IP session via an unassigned port.

6. (Original) The method of claim 1 wherein the gathering status information for the multiplexing element comprises gathering a network address for the multiplexing element.

7. (Original) The method of claim 6 wherein the gathering the network address for the multiplexing element comprises gathering a cilli code for the multiplexing element.

8. (Original) The method of claim 1 wherein the issuing the first and second interface retrieve commands comprise issuing protocol-independent interface retrieve commands.

9. (Original) The method of claim 8 wherein the issuing the protocol-independent interface retrieve commands comprise issuing transport level interface retrieve commands.

10. (Currently Amended) The method of claim 1 wherein the ~~gathering the status information for the switch fabric comprises determining a number of logical cross-connects in the multiplexing element~~ further comprising storing the status information in a flat file in a memory.

11. (Currently Amended) The method of claim ~~10~~ 1, wherein the gathering the status information for the switch fabric comprises gathering a logical cross-connect type for each of the logical cross-connects in the multiplexing element.

12. (Currently Amended) The method of claim 1 further comprising ~~the step of~~ storing the status information in a memory.

13. (Currently Amended) The method of claim 1 further comprising ~~the step of producing a~~ displaying and printing the report based on the status information.

14.-15. (Canceled).

16. (Currently Amended) A system for inventorying a broadband access network multiplexing element switch fabric, comprising:

a broadband access network comprising a multiplexing element switch fabric;

a digital subscriber line access multiplexer (DSLAM) forming a portion of the broadband access network;

an element manager, the element manager comprising an intermediary between a network manager and the multiplexing element;

a first communications path between the element manager and the multiplexing element, the first communications path carrying information and control commands between the element manager and the multiplexing element;

an inventory tool at a location remote from the element manager, the inventory tool generating switch fabric inventory commands and compiling switch fabric inventory information received in response to the switch fabric inventory commands;

wherein the switch fabric inventory information comprise a number of logical cross-connects provisioned in the switch fabric;

a second communications path between the inventory tool and the element manager, the second communications path carrying the switch fabric inventory commands and switch fabric inventory information between the inventory tool and the element manager; and

a memory saves and maintains the fabric switch inventory information.

17. (Original) The system of claim 16 wherein the inventory tool comprises a software client running on a computer.

18. (Previously Presented) The system of claim 17 wherein the software client includes a TCP/IP stack and the first communications path comprises a TCP/IP link.

19. (Original) The system of claim 18 wherein the TCP/IP link compromises a terminal emulation protocol link.

20. (Original) The system of claim 19 wherein the terminal emulation protocol link comprises a telnet link.

21. (Original) The system of claim 18 wherein the TCP/IP link comprises a TCP/IP link utilizing an unassigned port.

22. (Original) The system of claim 16 wherein the inventory commands generated by the inventory tool comprise interface retrieve commands.

23. (Original) The system of claim 22 wherein the interface retrieve commands generated by the inventory tool comprise protocol-independent interface retrieve commands.

24. (Original) The system of claim 22 wherein the interface retrieve commands generated by the inventory tool comprise transport level interface retrieve commands.

25. (Currently Amended) The system of claim 16 wherein the switch fabric inventory information ~~returned in response to the inventory commands comprises a number of logical cross-connects in the switch fabric.~~ is stored in a flat file in the memory.

26. (Currently Amended) The system of claim ~~25~~ 16, wherein the switch fabric inventory information returned in response to the inventory commands further comprises a logical cross-connect type.

27. (Currently Amended) A system for inventorying a broadband access network multiplexing element switch fabric, comprising:

means for inventorying a broadband access network multiplexing element switch fabric from a remote location;

means for forming a portion of a broadband access network with a digital subscriber line access multiplexer (DSLAM);

means for establishing communication with an element manager from a the remote location, the element manager comprising an intermediary between a network manager and the multiplexing element;

means for gathering status information for the multiplexing element by issuing a first interface retrieve command to the element manager from the remote location; wherein gathering the status information comprises determining a number of logical cross-connects provisioned in the multiplexing element switch fabric;

means for gathering switch fabric inventory information for the fabric structure of the multiplexing element by issuing a second interface retrieve command to the multiplexing element from the remote location, by utilizing the status information for the element manager;

means for receiving and compiling the status information from the element manager; and

means for maintaining an inventory of the number of cross-connects in the DSLAM and in the broadband access network from the remote location.